ABSTRACT

A configurable lookup table system including a first controller coupled to a first lookup table and a second controller coupled to a second lookup table is disclosed. The first controller configures the first lookup table for a first type lookup, which can be a Layer 2 or Media Access Control (MAC) type. The second controller configures the second lookup table based on a mode determination. If in a first mode, the second lookup table can be configured for a second type lookup, which can be a Layer 3 or Internet Protocol (IP) type. If in a second mode, the second lookup table can be configured for the first type lookup. This approach provides an efficient scheme for controlling and using multiple internal lookup tables for a variety of product configurations.